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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/033,988	12/28/2001	Thomas H. DiStefano	TESSERA 3.0-146 DIV	9840
530	7590	09/09/2004	EXAMINER	
LERNER, DAVID, LITTENBERG, KRUMHOLZ & MENTLIK 600 SOUTH AVENUE WEST WESTFIELD, NJ 07090			NORRIS, JEREMY C	
			ART UNIT	PAPER NUMBER
			2841	

DATE MAILED: 09/09/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/033,988

Applicant(s)

DISTEFANO ET AL.

Examiner

Jeremy C. Norris

Art Unit

2827

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 17 June 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,5,7,8,13,18 and 19 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 7,8,13 and 18 is/are allowed.
- 6) ☒ Claim(s) 1,5 and 19 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 28 December 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
✓ Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

**DETAILED ACTION**

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by US 5,280,139 (hereafter Suppelsa).

Suppelsa discloses, referring to figures 1 & 2, a connection component for a microelectronic element assembly, said component comprising: a support structure having a dielectric layer (12), a plurality of first regions, a second region, and a top surface, wherein the top surface is defined by the plurality of first regions and the second region; a plurality of adhesion promoter regions, each of said adhesion promoter regions being associated with one of said plurality of first regions, disposed over the associated first region, and comprised of an adhesion promoter (14) a plurality of leads (16) disposed on the dielectric layer, each of said leads having a terminal end associated with one of said plurality of adhesion promoter regions and permanently connected to the associated adhesion promoter region, and a tip end (18) releasably attached to the second region and offset from the terminal end; and D. a plurality of release interfaces, each of said release interfaces being associated with a tip end, wherein each of said release interfaces is located between the associated tip end and

the second region of the support structure and wherein each of said release interfaces is free of the adhesion promoter (see col. 2, lines 15-45) [claim 1].

Claims 5 and 19 are rejected under 35 U.S.C. 102(b) as being anticipated by US 5,489,749 (hereafter DiStefano).

DiStefano discloses, referring to figure 5, a connection component for a microelectronic element assembly, said component comprising: A. a support structure having a dielectric layer (38), a plurality of first regions, a second region, and a top surface, wherein the top surface is defined by the plurality of first regions (102) and the second region (36); B. a plurality of leads (56) disposed on the top surface of said support structure, each of said leads having a terminal end (48, 50) permanently connected to the second region; and a tip end associated with one of the plurality of first regions, disposed over the associated first region, and offset from the terminal end; and C. a plurality of release interfaces, each of said release interfaces corresponding to one of said plurality of leads, located between the tip end of the corresponding lead and the associated first region of said support structure, and formed by locally heating the tip end of the corresponding lead (see col. 13, lines 15-25) [claim 5].

Additionally, DiStefano discloses, a connection component for a semiconductor assembly, said component comprising; A. a support structure having a dielectric layer (38) and a top surface; B. a plurality of first bonding pads (48, 50) disposed on the top surface; wherein each first bonding pad is comprised of a first conductive material; C. a plurality of second bonding pads (102) disposed on the top surface, wherein each of the

second bonding pads is associated with one of the first bonding pads and is comprised of a second conductive material; and D. a plurality of leads (56), wherein each lead has a terminal end permanently connected to one of the plurality of first bonding pads; and a tip end connected to the associated second bonding pad and offset from the terminal end; wherein the permanent connection between the terminal end and the first bonding pad is stronger than the connection between the tip end and the associated second bonding pad (see col. 13, lines 5-35) [claim 19].

***Response to Arguments***

Applicant's arguments with respect to claims 1, 5, and 19 have been considered but are moot in view of the new ground(s) of rejection.

***Allowable Subject Matter***

Claims 7, 8, 13, and 18 are allowed.

The following is a statement of reasons for the indication of allowable subject matter: Claim 7 states the limitation "formed by depositing a heat susceptible material on each of the plurality of first regions". This limitation, in conjunction with the other claimed limitations was neither found to be disclosed in, nor suggested by the prior art. Claim 8 states the limitation "each of said leads having a terminal end permanently connected to the second region; and a tip end associated with one of the plurality of polymer layers, releasably attached to the associated polymer layer, and offset from the terminal end". This limitation, in conjunction with the other claimed limitations was neither found to be disclosed in, nor suggested by the prior art. Claim 13 states the limitation "wherein the melting point of the second conductive material is higher than the

melting point of the first conductive material". This limitation, in conjunction with the other claimed limitations was neither found to be disclosed in, nor suggested by the prior art. Claim 18 states the limitation "a plurality of graphite regions disposed over the plurality of first regions, each of said plurality of graphite regions associated with one of said plurality of first regions and prepared by depositing graphite over the associated first region. This limitation, in conjunction with the other claimed limitations was neither found to be disclosed in, nor suggested by the prior art.

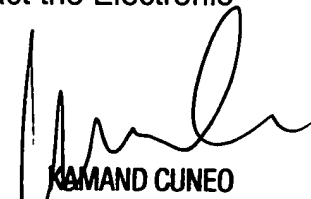
### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeremy C. Norris whose telephone number is 571-272-1932. The examiner can normally be reached on Monday - Friday, 9:30 am - 5:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kamand Cuneo can be reached on 571-272-1957. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

JCSN



**KAMAND CUNEO**  
**SUPERVISORY PATENT EXAMINER**  
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